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Study on Chinese Acrolepiidae and Choreutidae (Insecta: Lepidoptera)

Yu. I. Budashkin & H. H. Li

Abstract

A list of sixteen Chinese Acrolepiidae and Choreutidae species is presented with images of adults provided. Nine species are recorded for the first time in China. Two new species, *Litobrenthia angustipunctata* Budashkin & Li, sp. n. (Hunan), *Prochoreutis alpinoides* Budashkin & Li, sp. n. (Shaanxi), and the female of *Choreutis cunuligera* Diakonoff are described with genital structures illustrated.

KEY WORDS: Lepidoptera, Acrolepiidae, Choreutidae, new species, new record, China.

Estudio sobre Acrolepiidae y Choreutidae chinos (Insecta: Lepidoptera)

Resumen

Se presenta una lista de dieciséis especies chinas de Acrolepiidae y Choreutidae con imágenes de los adultos. Nueve especies se citan por primera vez en China. Se describen e ilustran la genitalia de dos nuevas especies, *Litobrenthia angustipunctata* Budashkin & Li, sp. n. (Hunan), *Prochoreutis alpinoides* Budashkin & Li, sp. n. (Shaanxi) y de la hembra de *Choreutis cunuligera* Diakonoff.

PALABRAS CLAVE: Lepidoptera, Acrolepiidae, Choreutidae, nuevas especies, nuevas citas, China.

Introduction

At present the Chinese fauna of Acrolepiidae and Choreutidae has been studied rather fragmentarily. Only seven species of Acrolepiidae (GAEDIKE, 1971; MORIUTI, 1972; GAEDIKE, 1994; BUDASHKIN, 1997) and 33 species of Choreutidae (DIAKONOFF, 1967; DANILEVSKY & KUZNETSOV, 1981; DIAKONOFF, 1986) were known for the territory of such vast country. Among these records, one species of Acrolepiidae and eight species of Choreutidae were recorded in Taiwan only, and one species of Choreutidae was discovered in Hainan only.

For the purpose of further investigating the Chinese fauna of the above mentioned two families, we began to study in 2007 the collections of the Chinese scientific Institutions. The present contribution is based partially on the revised material deposited in Nankai University. The types of new species are deposited in the collection of Nankai University (Tianjin, China), except one male paratype of *Litobrenthia angustipunctata* sp. n. deposited in the collection of Zoological Museum of Taras Shevchenko University (Kiev, Ukraine).

Family Acrolepiidae

Digitivalva sibirica (Toll, 1958) (Fig. 1)

Acrolepia sibirica Toll, 1958, Z. wien. ent. Ges., **43**: 86, 89, figs. 5-6 (Primorskiy kray: Vladivostok).

Digitivalva moriutii Gaedike, 1982, *Reichenbachia*, **20** (2): 25, figs. 1-3 (Honsyu: Tyubu-Nagano).

Material examined: 1 male, CHINA: Dashahe [28° 53' N, 107° 36' E], Daozhen, Guizhou Province, alt. 1450 m, 23-V-2004, leg. Shulian Hao.

Distribution: China (Guizhou, Yunnan), Russia (Primorskiy kray, Khabarovskaya oblast', Amurskaya oblast', Yuzhniye Kurili: Kunashir), Korea, Japan (Honsyu).

Acrolepiopsis ussurica Zagulajev, 1981 (Fig. 2)

Acrolepiopsis ussurica Zagulajev, 1981, *Trudy zool. Inst. Leningr.*, **92**: 87, figs. 1-2 (Primorskiy kray: zapovednik "Kedrovaja pad").

Material examined: 4 males, CHINA: Mt. Baxian, Jixian [40° 02' N, 117° 24' E], Tianjin, alt. 510 m, 16-VIII-1997, leg. Houhun Li and Shuxia Wang.

Distribution: China (Tianjin), Russia (Primorskiy kray, Amurskaya oblast').

Notes: This species is newly recorded for China.

Acrolepiopsis sapporensis (Matsumura, 1931) (Fig. 3)

Diplodoma marginepunctella f. *sapporensis* Matsumura, 1931, *6000 Ill. Ins. Japan*: nr. 1107 (Hokkaido: Sapporo).

Acrolepia alliella Semenov & Kuznetsov, 1956, *Zool. Zh.*, **35**: 1676, figs. 1-3 (Vostochnaya Sibir': Krasnoyarskaya oblast', Yarcevo).

Material examined: 4 males, 2 females, CHINA: Mt. Jigong [31° 49' N, 114° 06' E], Xinyang, Henan Province, alt. 700 m, 9-10-VII-1997, leg. Houhun Li and Shuxia Wang; 1 female, CHINA: Mt. Baiyun [34° 08' N, 112° 05' E], Songxian, Henan Province, alt. 1560 m, 23-VII-2001, leg. Dandan Zhang; 1 female, CHINA: Huguosi [27° 55' N, 108° 41' E], Mt. Fanjing, Guizhou Province, alt. 1390 m, 28-V-2002, leg. Xipu Wang; 1 male, CHINA: Baotianman [33° 02' N, 111° 50' E], Neixiang, Henan Province, alt. 1200 m, 31-V-2006, leg. Jinmei Lv and Xu Zhang; 1 male, CHINA: Lichuan [30° 18' N, 108° 56' E], Hubei Province, alt. 1100 m, 2-VIII-1999, leg. Houhun Li *et al.*

Distribution: China (Guizhou, Henan, Hubei), Mongolia, Russia (Primorskiy kray, Khabarovskaya oblast', Amurskaya oblast', Zabaykalye, Vostochnaya Sibir', Yuzhniye Kurili: Kunashir), Korea, Japan (Hokkaido, Honsyu, Shikoku, Kyusyu), Hawaii Is.

Notes: This species is newly recorded for China.

Acrolepiopsis kostjuki Budashkin, 1998 (Fig. 4)

Acrolepiopsis kostjuki Budashkin, 1998, *Zh. Ukr. ent. tovar.*, **4**(1-2): 30, figs. 1-2 (Zabaykalye: Nizhniy Tsasuchey).

Material examined: 1 female, CHINA: Yangling [34° 17' N, 108° 04' E], Shaanxi Province, alt. 450 m, 8-VI-1993, leg. Houhun Li (collection no. 93006); 2 females, CHINA: Yangling, Shaanxi Province, alt. 450 m, 24-V-1985, leg. Houhun Li; 1 female, CHINA: Yangling, Shaanxi Province, alt. 450 m, collected from the fruit of date (*Zizyphus jujuba* Mill.), 22-X-1990, leg. Houhun Li; 1 male, CHINA: Limutai [40° 02' N, 117° 24' E], Jixian, Tianjin, alt. 180 m, 11-VI-2004, leg. Houhun Li *et al.*

Host plant: *Zizyphus jujuba* Mill.

Distribution: China (Shaanxi, Tianjin), Mongolia, Russia (Amurskaya oblast', Zabaykalye).

Notes: This species is newly recorded for China.

Family Choreutidae

Litobrenthia angustipunctata Budashkin & Li, sp. n. (Figs. 5, 17-18)

Material examined: Holotype, male, CHINA: Zhangjiajie [29° 49' N, 110° 26' E], Hunan Province, alt. 650 m, 10-VIII-2001, leg. Houhun Li and Xipu Wang. Paratypes, 2 males (genitalia slide nr. 222/08), (1 male deposited in the collection of Zoological Museum of Taras Shevchenko

University, Ukraine, Kiev), 1 female (genitalia slide nr. 221/08), collectors and site same as holotype except dated 7-11-VIII-2001.

Description Male (Fig. 5): Wingspan 10.5-11.0 mm. Head, thorax and tegula olive. Eyes and tegula surrounded by white scales. Antennae olive, shortly ciliate. Scapus and 8-9 basal antennal segments with white spot on upper side. Labial palpus white, with 3-4 olive rings. Forewing broadly rounded triangular, dark olive with inconspicuous slender whitish transverse fascia at one-fifth length of wing and relatively large transversely elongate white discal spot; distal 1/6 darkened, diffused with eight small pink-violet metallic spots along termen; small white spot on proximal limit of darkened near half width of wing; small clouds of bluish-metallic scales at costal one-twentieth, one-fifth, two-fifths and four-fifths; indistinct patches of whitish scales under discal spot; cilia olive with white subapical spot. Hindwing dark, olive grey, with indistinct whitish spot in proximal part, white submarginal striped and apical stripe-shaped patch with pink-metallic scales; cilia dark olive grey with white apical part and white stroke under submarginal stripe. Female differs externally from male in absence of short cilia on antennae.

Male genitalia (Fig. 17): Tegumen simple, thin, weakly curved. Tuba anales short, apically naked. Valva simple, distal half broader than two times of basal half, rounded-triangular, slightly covered with hair, apically edged with four small teeth; sacculus indistinct. Juxta fused with anellus, large, caudally with two triangular lateral plates. Saccus robust and longer than tegumen plus tuba anales, distal half smoothly broadened to near apex. Aedeagus simple, slender and straight, basal 1/3 broadened; cornuti composed of dense bundle of numerous spicules in vesica medially.

Female genitalia (Fig. 18): Papillae anales membranous, covered with thick moderate long setae. Posterior and anterior apophyses comparatively long and slender. Ostium situated intersegmentally, middle size, trapeziform. Antrum weakly sclerotized as narrow ring. Ductus bursae narrow, membranous, about 2 times as long as apophyses anteriores, with curved sclerotized broadening before corpus bursae. Corpus bursae oval, with two signa: one strongly sclerotized round-trapeziform plate at entrance of ductus bursae, another long arched band of numerous sclerotized small teeth in lateral part of corpus bursae.

Distribution: China (Hunan).

Diagnosis: The new species is very similar externally to *Litobrenthia luminifera* (Meyrick, 1912), **new combination**, but differs in narrower and transversely elongate white discal spot of forewing and in shape of valva and the saccus in male genitalia. The female genitalia well differ from other congeners in the trapeziform ostium and specific shape of signa.

Etymology: The specific name is derived from the Latin prefix *angusti-* (narrow) and *punctatus* (spot), in reference to the pattern of the forewing.

Anthophila fabriciana (Linnaeus, 1767) (Fig. 6)

Phalaena Tortrix fabriciana Linnaeus, 1767, *Syst. Nat.*, ed. 12: 880, nr. 324 (Sweden: Hammarby).

Phalaena Tinea oxyacanthella Linnaeus, 1767, *Syst. Nat.*, ed. 12: 886, nr. 357 (Type locality not indicated).

Tortrix urticana [Denis & Schiffermüller], 1775, *Ankündigung eines syst. Werkes Schmett. Wiener Gegend*: 132 (Austria: Vienna Distr.).

Ph. [alaena] Pallium excisum Retzius, 1783, *De Geer, Gen. Spec. Ins.*: 52, nr. 148 (emendation).

Phal. [aena] Tortrix gilbertiana Villers, 1789, *Caroli Linnaei Ent.*, 2: 425, nr. 761 (Europe).

Crambus oxyacanthae Fabricius, 1798, *Suppl. Ent. Syst.*: 474, nr. 59 (emendation).

Tortrix dentana Hübner, [1799], *Samml. eur. Schmett.*, Tortr.: pl. 41, fig. 273 (Europe).

Anthophila fabricii Haworth, 1811, *Ins. Brit.*: 471, nr. 1 (emendation).

Asopia alternalis Treitschke, 1829, *Schmett. Eur.*, 7: 160 (Europe).

Simaethis parietariae Stainton, 1855, *Ent. Ann.*: 42 (Great Britain).

Material examined: 1 female, CHINA, Gongliu (Tokkuztara) [43° 28' N, 82° 13' E], Xinjiang Uigur Autonomous Region, alt. 1500 m, 28-VIII-1994, leg. Houhun Li and Hongyan Qing.

Distribution: China (Taiwan, Xinjiang), Himalai, Mongolia, Russia (Dal'niy Vostok, Sakhalin, Yuzhniye Kurili: Kunashir, Iturup, Paramushir; Vostochnaya Sibir', Zabaykaliye, Tuva, Ural, Evropeyskaya chast', Kavkaz), Korea, Japan (Hokkaido, Honsyu, Shikoku), Afghanistan, Kazakhstan, Europe, Canary Is., Asia Minor, Zakavkazye, Oriental Region.

Choreutis cunuligera (Diakonoff, 1978) (Figs. 7, 19)

Eutromula cunuligera Diakonoff, 1978, *Zoöl. Meded. Leiden*, **53**: 205, fig. 3 (Chekiang: W. Tien-mu-shan).

Material examined: 1 female, CHINA, Heiwan [27° 55' N, 108° 41' E], Mt. Fanjing, Guizhou Province, alt. 530 m, 3-VI-2002, leg. Xipu Wang, genitalia slide nr. 241/08.

Female genitalia (Fig. 19). Papillae anales membranous, broad semioval, covered with thick moderate long setae. Posterior and anterior apophyses median length and thickness. Sternite VII trapeziform, with concave caudal edge and well sclerotized caudal part. Ostium placed under caudal edge of sternite VII, middle size, narrow oval. Antrum a sclerotized relatively broad ring with concave lateral edges. Ductus bursae membranous, median length and width. Corpus bursae middle size, rectangularly rounded with flat bottom; signa transversely elongate, gutter-shaped sclerite, covered with numerous small thorns.

Distribution: China (Guizhou, Zhejiang), Japan (Honsyu).

Diagnosis: *Choreutis cunuligera* Diakonoff is similar to *C. cyanogramma* Diakonoff & Arita in female genitalia, but differs from this and other species in the shape and degree of sclerotization of sternite VII, and well sclerotized ring-shaped antrum.

Notes: The female of this species is described for the first time.

Choreutis achyrodes (Meyrick, 1912) (Fig. 8)

Simaethis achyrodes Meyrick, 1912, *Exot. Microlepidopt.*, **1**: 46 (India: Nilgiri Hills).

Simaethis albifascialis Marumo, 1923, *J. Coll. Agric. imper. Univ. Tokyo*, **8**: 199, pl. 3, fig. 9 (Kyusyu: Yakushima).

Simaethis kochiensis Matsumura, 1931, *6000 Ill. Ins. Japan*: 1080, nr. 2194 (Shikoku).

Material examined: 1 male, CHINA, Suoluo Nature Reserve [26° 42' N, 116° 22' E], Chishui, Guizhou Province, alt. 390 m, 29-V-2000, leg. Yanli Du; 1 female, CHINA, Mt. Pinglong [22° 09' N, 107° 58' E], Shangsi, Guangxi Zhuangzu Autonomous Region, alt. 510 m, 6-IV-2002, leg. Shulian Hao and Huaijun Xue.

Distribution: China (Guangxi, Guizhou, Taiwan), Japan (Shikoku, Kyusyu, Ryukyu Is.), India (Assam), Oriental Region.

Notes: This species is a first record for Mainland China.

Choreutis montana (Danilevsky, 1973) (Fig. 9)

Hemerophila montana Danilevsky, 1973, *Trud̆y vses. ent. Obsch.*, **56**: 16, figs. 8, 11 (Kirghizia).

Material examined: 30 males, 6 females, CHINA, Xining Arboretum [3638 N, 10148 E], Xining, Qinghai Province, alt. 2280 m, 20-VII-1995, leg. Houhun Li and Shuxia Wang.

Host plants: *Malus* sp., *Amelanchier* sp., *Ulmus pumila* Linn.

Distribution: China (Qinghai), Kirghizia, Tadzhikistan, Kazakhstan.

Notes: This species is a first record for China. *Ulmus pumila* is recorded as its host plant for the first time.

Tebenna micalis (Mann, 1857) (Fig. 10)

Choreutis micalis Mann, 1857, *Wien. ent. Monatschr.*, **1**: 181 (Italy: Fiume).

Choreutis isschiki Matsumura, 1931, *6000 Ill. Ins. Japan*: 1078, nr. 2184 (Honsyu: Kii).

Tebenna bradleyi Clarke, 1971, *Smithson. Contr. Zool.*, **56**: 166, pl. 224, fig. 131 (New Zealand: Haumoana, Hawkes Bay).

Material examined: 1 male, CHINA, Nyingchi (Pula) [29° 41' N, 94° 21' E], Xizang (Tibet)

Autonomous Region, alt. 2900 m, 22-VI-1983, leg. Houhun Li; 1 female, CHINA, Gushi [32° 10' N, 115° 41' E], Henan Province, 17-V-1995, leg. Guangyun Yan; 3 males, CHINA, Mt. Baling [30° 21' N, 112° 11' E], Jingzhou, Hubei Province, alt. 100 m, 26-VII-2003, leg. Shulian Hao; 2 females, CHINA, Jinsha [28° 21' N, 117° 07' E], Yiyang, Jiangxi Province, alt. 380-390 m, 15, 18-IV-2007, leg. Xicui Du and Haiyan Bai.

Distribution: China (Henan, Hubei, Jiangxi, Xizang (Tibet), Zhejiang), Nepal, Russia (Kavkaz), Japan (Honsyu, Ryukyu Is.), Afghanistan, Tadzhikistan, Uzbekistan, Turkmenia, S & M Europe, Canary Is., N Africa, Arabia, Asia Minor, Zakavkazye, Iran, Lebanon, New Zealand, and Oriental, Ethiopian, Australian, Nearctic regions.

Tebenna submicalis Danilevsky, 1969 (Fig. 11)

Tebeuna (sic!) *submicalis* Danilevsky, 1969, *Ent. Obozr.*, **48**: 923, figs. 5-6 (Kuril'skiye ostrova: Kunashir).

Material examined: 1 male, CHINA, Yangling [34° 17' N, 108° 04' E], Shaanxi Province, alt. 450 m, 22-V-1985, leg. Houhun Li; 1 female, CHINA, Yangba [33° 20' N, 105° 36' E], Kangxian, Gansu Province, alt. 950 m, 18-IV-1994, leg. Jin Zhou; 1 male, CHINA, Mahe [29° 40' N, 109° 08' E], Xianfeng, Hubei Province, alt. 400 m, 24-VII-1999, leg. Houhun Li *et al.*

Distribution: China (Shaanxi, Gansu, Hubei), Nepal, Russia (Sakhalin, Yuzhniye Kurili: Kunashir), Japan (Hokkaido).

Notes: This species is recorded for the first time in China.

Prochoreutis myllerana (Fabricius, 1794) (Fig. 12)

Pyrallis myllerana Fabricius, 1794, *Ent. Syst.*, **3** (2): 277, nr. 147 (Sweden).

Anthophila mylleri Haworth, [1811], *Ins. Brit.*: 472, nr. 5 (emendation).

Tortrix augustana Hübner [1813], *Samml. eur. Schmett.*, Tortr., **7**: pl. 32, fig. 204 (Europe).

Choreutis scintilulana Hübner [1825], *Verz. bekannt. Schmett.*: 373, nr. 3578 (Type locality not indicated).

Choreutis scintilulalis Treitschke, 1835, *Schmett. Eur.*, **10**: 33 (emendation).

Choreutis albipunctalis Zetterstedt, [1839], *Ins. Lapponica*: 974 (Lapland).

Choreutis mullerana von Heyden, 1865, *Stettin. ent. Ztg.*, **26**: 104 (emendation).

Material examined: 1 male, CHINA, Jinghe [44° 39' N, 82° 56' E], Xinjiang Uigur Autonomous Region, 23-VIII-1994, leg. Douliken Baishanbayi (collection nr. 94022); 1 female, CHINA, Nenjiang [49° 10' N, 125° 12' E], Heilongjiang Province, alt. 300 m, 29-VII-1997, leg. Houhun Li.

Distribution: China (Heilongjiang, Xinjiang), Russia (Primorskiy kray, Khabarovskaya oblast', Sakhalin, Sibir', Evropeyskaya chast', Kavkaz), Korea, Japan (Hokkaido), Europe.

Notes: This species is a new record for China.

Prochoreutis sehestediana (Fabricius, 1777) (Fig. 13)

Pyrallis sehestediana Fabricius, 1777, *Gen. Ins.*: 293 (Germany: Kiel).

Anthophila punctosa Haworth, [1811], *Ins. Brit.*: 472, nr. 6 (England).

Choreutis philonyma Meyrick, 1912, *Exot. Microlepidot.*, **1**: 55 (Sri Lanka: Hakgala).

Choreutis phalaraspis Meyrick, 1923, *Exot. Microlepidopt.*, **2**: 617 (India: Kumaon).

Material examined: 6 males, CHINA, Yangling [34° 17' N, 108° 04' E], Shaanxi Province, alt. 450 m, 7-VI-1985, leg. Houhun Li; 1 male, CHINA, Yangling [34° 17' N, 108° 04' E], Shaanxi Province, alt. 450 m, 30-VI-1993, leg. Houhun Li (collection nr. 93020); 1 male, CHINA, Yangling [34° 17' N, 108° 04' E], Shaanxi Province, alt. 450 m, 30-V-1995, leg. Douliken Baishanbayi; 1 female, Longtan Forestry Farm, Mt. Liupan, Ningxia Huizu Autonomous Region, 25-VI-2008, leg. Shulian Hao and Zhiwei Zhang.

Distribution: China (Ningxia, Shaanxi), India, Sri Lanka, Nepal, Russia (Primorskiy kray, Ural, Evropeyskaya chast', Kavkaz), Japan (Hokkaido, Shikoku), Europe, Asia Minor, Zakavkazye, Syria, Oriental Region.

Notes: This species is a new record for China.

***Prochoreutis alpinoides* Budashkin & Li, sp. n.** (Figs. 14, 20)

Material examined: Holotype, female, CHINA: Huoditang, Ningshan [33° 19' N, 108° 20' E], Shaanxi Province, alt. 1620 m, 15-VI-1987, leg. Houhun Li (collection nr. 87057), genitalia slide nr. 242/08.

Description: Female (Fig. 14): wingspan 11.0 mm. Head, thorax and tegula olive. Eyes and tegula surrounded by white scales. Face covered with white scales. Antennae dark olive, with white rings on each segment. First segment of labial palpus white, second olive with raised dark olive-white scales, third segment with dark olive-white scales. Forewing triangular, termen weakly oblique; dark olive, with three white costal marks, two discal white points and slender transverse metallic fascia from second mark; single white and metallic scales diffused through wing area, white scales mainly in dorsal and medial part, metallic scales in subcostal, subapical and terminal parts; cilia with basal and subapical parts dark olive, medial part whitish and apical part white (except three unicolor parts, dark olive at apex, middle of termen and tornus). Hindwing concolorous with forewing but lighter, with comparatively long submarginal white stripe; cilia as forewing, but with only two unicolour parts, dark olive on apex and along inner margin.

Female genitalia (Fig. 20): Papillae anales membranous, rectangular oval, covered with thick moderate short setae. Posterior and anterior apophyses comparatively long and slender. Sternite VII trapeziform, with narrow, medially cut caudal margin, and connected with ostium. Ostium middle size, almost oval. Antrum weakly sclerotized, asymmetrical, narrowly funnel-shaped. Ductus bursae membranous, weakly sclerotized in middle at one-third length, moderately short and slender, anterior half suddenly broadened, bulla seminalis arising from middle. Corpus bursae large, elliptic, longer than ductus bursae. Signum setting on left side of corpus bursae, long and narrow, longer than half of corpus bursae in length, covered with numerous small thorns.

Male: Unknown.

Distribution: China (Shaanxi).

Diagnosis: The new species is very similar externally to *Prochoreutis alpina* Arita, but differs in distinct transverse metallic fascia from second costal mark of forewing and longer submarginal stripe of hindwing. The female genitalia of the new species is also similar to those of *P. alpina* Arita, but differ in longer sternite VII deeply and narrowly are medially on caudal margin, smaller ostium and antrum, and larger and plate-shaped signum.

Etymology: The specific name is derived from the Latin postfix - *oides* = like, and *Prochoreutis alpina* Arita, indicating the similarity of the two species.

Prochoreutis diakonoffi Arita, 1985 (Fig. 15)

Prochoreutis diakonoffi Arita, 1985, *Ent. Ber. Amst.*, **45** (9): 115, figs. 1-2 (Honsyu: Mt. Sanage-yama).

Material examined: 1 male, CHINA, Huoditang [33° 19' N, 108° 20' E], Ningshan, Shaanxi Province, alt. 1620 m, 25-V-1990, leg. Houhun Li (collection nr. 90002).

Distribution: China (Shaanxi), Japan (Honsyu).

Notes: This species is new record for China.

Prochoreutis holotoxa (Meyrick, 1903) (Fig. 16)

Choreutis myllerana forma *holotoxa* Meyrick, 1903, *Entomologist's mon. Mag.*, **39**: 5 (Austria: S. Tyrol).

Choreutis sibirica Hackman, 1947, *Notul. ent.*, **26**: 72, 75 (Siberia: W. Sujetuk).

Choreutis incerta Căpușe, 1970, *Alexanor*, **6**: 354 (Romania).

Choreutis myllerana holotoxa Meyrick, 1903: CLARKE, 1969, *Cat. Type Specimens Microlepid. Br. Mus. nat. Hist. descr. E. Meyrick*, **6**: 48.

Prochoreutis holotoxa (Meyrick, 1903): DIAKONOFF, 1984, *Zoöl. Meded. Leiden*, **58** (5): 63.
Material examined: 1 male, CHINA, Fanshi County [39° 12' N, 113° 16' E], Shanxi Province, alt. 1600 m, 23-VII-1972.

Distribution: China (Shanxi), Austria (Tirol), Switzerland (Zermatt), Rumania, Russia (Siberia).

Notes: This species is a new record for China.

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BIBLIOGRAPHY

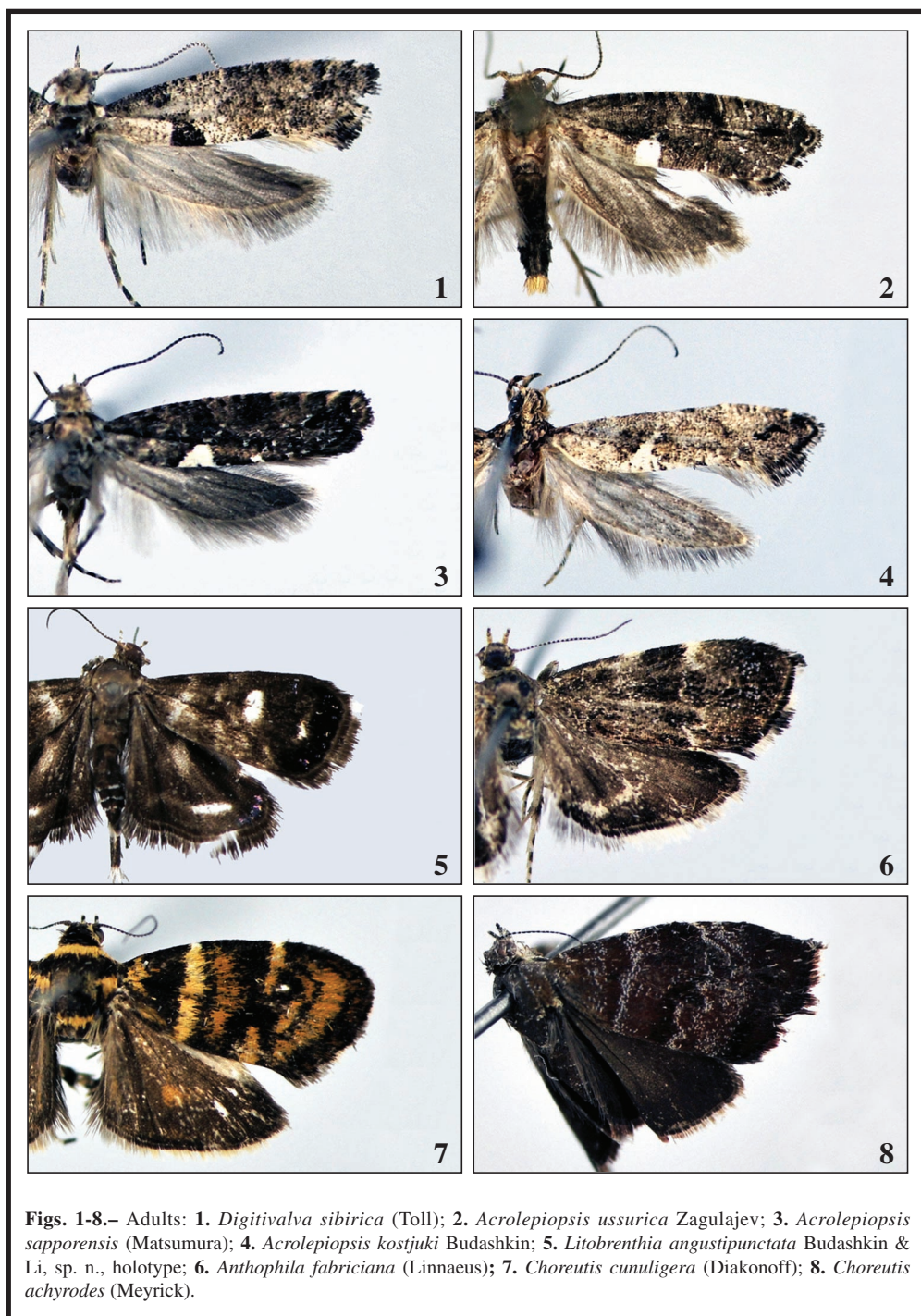
- BUDASHKIN, Y. I., 1997.— Acrolepiidae. In P. A. LER (ed.). *Key to identification of the insects of Russian Far East. Trichoptera and Lepidoptera*, **5** (1): 458-468. Dal'nauka, Vladivostok.
- CLARKE, J. F. G., 1969.— *Catalogue of the Type Specimens of Microlepidoptera in the British Museum (Natural History) described by Edward Meyrick. Glyphipterygidae*, **6**: 1-216, pls. 1- 108.
- DANILEVSKY, A. S. & KUZNETSOV, V. I., 1981.— Choreutidae. In G. S. MEDVEDEV (ed.). *Key to identification of the insects of European part of USSR. Lepidoptera*, **4** (2): 103-136. Nauka, Leningrad.
- DIAKONOFF, A., 1967.— Microlepidoptera of the Philippine Islands.— *Bull. U. S. natn. Mus.* **257**: 484 pp., 846 figs.
- DIAKONOFF, A., 1984.— A systematic and synonymic list of the Palaearctic representatives of the so-called Glyphipterygidae Meyrick, 1913 (Lepidoptera), with descriptions of two new taxa.— *Zoöl. Meded. Leiden*, **58**(3): 59-84.
- DIAKONOFF, A., 1986.— Glyphipterigidae (sensu lato). In H. G. AMSEL, F. GREGOR, H. REISSER & R.—U. ROESLER (ed.). *Microlepidoptera Palaearctica*, **7**: 436 pp., 175 pl. Verlag G. Braun, Karlsruhe.
- GAEDIKE, R., 1971.— Die Acrolepiidae der China-Ausbeute H. Höne (Lepidoptera: Acrolepiidae.— *Beitr. Ent.*, **21**(3/6): 273-277.
- GAEDIKE, R., 1994.— Zur Kenntnis der ostpaläarktischen Acrolepiidae (Lepidoptera).— *Beitr. Ent.*, **44**(2): 319-328.
- MEYRICK, E., 1912.— *Exotic Microlepidoptera*, **1**: 33-64.
- MORIUTI S., 1972.— Seven new species of Acrolepiidae from Japan and Formosa (Lepidoptera).— *Jap. J. Ent.*, **40**(4): 243-254.

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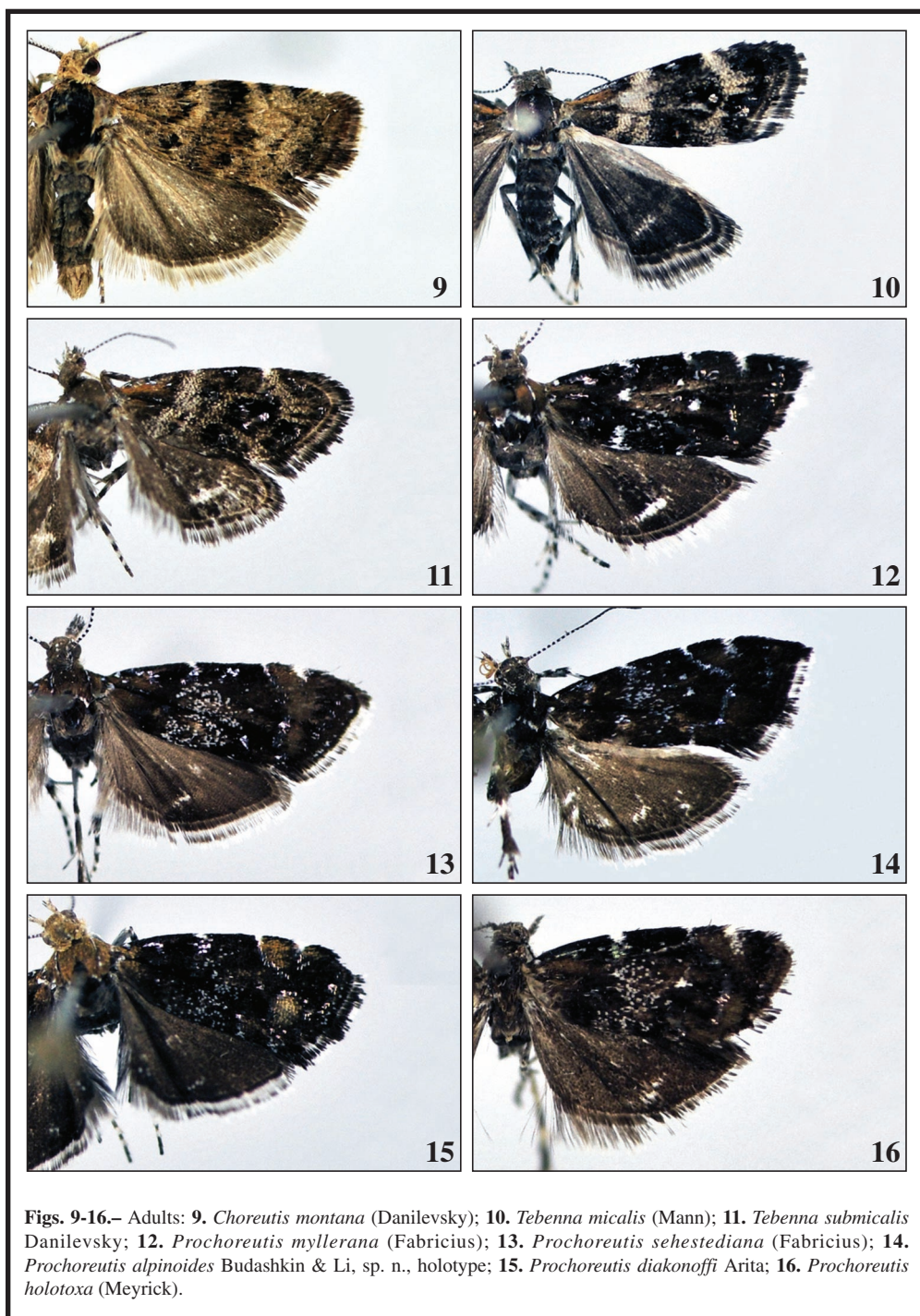
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Figs. 1-8.— Adults: 1. *Digitivalva sibirica* (Toll); 2. *Acrolepiopsis ussurica* Zagulajev; 3. *Acrolepiopsis sapporensis* (Matsumura); 4. *Acrolepiopsis kostjuki* Budashkin; 5. *Litobrenthia angustipunctata* Budashkin & Li, sp. n., holotype; 6. *Anthophila fabriciana* (Linnaeus); 7. *Choreutis cunuligera* (Diakonoff); 8. *Choreutis achyrodes* (Meyrick).



Figs. 9-16.— Adults: **9.** *Choreutis montana* (Danilevsky); **10.** *Tebenna micalis* (Mann); **11.** *Tebenna submicalis* Danilevsky; **12.** *Prochoreutis myllerana* (Fabricius); **13.** *Prochoreutis sehestediana* (Fabricius); **14.** *Prochoreutis alpinoides* Budashkin & Li, sp. n., holotype; **15.** *Prochoreutis diakonoffi* Arita; **16.** *Prochoreutis holotoxa* (Meyrick).



Fig. 17.— Male genitalia of *Litobrenthia angustipunctata* Budashkin & Li, sp. n., paratype (genitalia slide nr. 222/08).

